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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/748,667	12/22/2000	Kenneth A. Parulski	82037RLW	4667

7590 12/15/2004

Patent Legal Staff
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EXAMINER

JERABEK, KELLY L

ART UNIT	PAPER NUMBER
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2612

DATE MAILED: 12/15/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/748,667

Applicant(s)

PARULSKI ET AL.

Examiner

Kelly L. Jerabek

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 22 September 2004.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-24 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 1-11 and 16-24 is/are allowed.
- 6) ☒ Claim(s) 12-14 is/are rejected.
- 7) ☒ Claim(s) 15 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| Paper No(s)/Mail Date <u>12/9/2004</u> . | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Election/Restrictions

Applicant's election with traverse of species 7 in the reply filed on 9/22/2004 is acknowledged. The traversal is on the ground(s) that species 1-3, 4, and 6 are sub-species of the elected species. Applicant also states that all claims in this application are generic to the elected species. The Examiner is therefore withdrawing the restriction requirement made on 8/27/2004.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 12-13 rejected under 35 U.S.C. 103(a) as being unpatentable over Niikawa et al. US 2002/0171747 in view of Sakaida US 6,744,920.

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Re claim 12, Niikawa discloses in figures 1-3 a digital camera (1) including a CCD color sensor (303) for capturing an ambient light image as an electronic image. Niikawa states that the camera includes an EVF (20) and an LCD (10) capable of displaying an original captured image (20a) and a corrected image (10a) including corrections such as white balance, exposure compensation, and scene (page 6, paragraphs 123-130; figs. 16A, 16B). However, Niikawa fails to disclose color balancing an electronic image at a compensation point located on a reverse color space vector opposite in direction from a white balance color space vector.

Sakaida discloses a digital camera and a printer connected to the camera including reading means for reading image data and an inverse AWB means (9) for obtaining inverse AWB image data by carrying out inverse AWB processing (col. 6, lines 10-25). The inverse AWB processing means (9) obtains inverse AWB image data by carrying out the inverse of AWB processing (col. 7, lines 57-60). The inverse AWB image data (S0') can be regarded as the original image data (S0) immediately after photographing (col. 8, lines 5-10). Thus, since inverse AWB processing obtains image data regarded as the original image data (away from the white balance value) it can be seen that the image data is balanced at a compensation point (image data (S0') after inverse AWB processing) located on a reverse color space vector opposite in direction from a white balance color space vector. Therefore, it would have been obvious for one skilled in the art to have been motivated to include the concept of inverse AWB processing as disclosed by Sakaida in the correction operation for providing a corrected image as disclosed by Niikawa. Doing so would provide a means for applying inverse

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AWB processing to obtain image data that can be regarded as the original image immediately after photographing (Sakaida: col. 8, lines 6-10).

Re claim 13, Sakaida states that the inverse AWB image data (S0') can be regarded as the original image data (col. 8, lines 5-10). Therefore, inverse AWB processing utilizes a reverse color space vector opposite in direction from a white balance color space vector and the original image data lies at the terminus of the reverse color space vector (compensation point).

Claim 14 rejected under 35 U.S.C. 103(a) as being unpatentable over Niikawa et al. US 2002/0171747 in view of Sakaida US 6,744,920 and further in view of Higashihara et al. US 6,160,581.

Re claim 14, Niikawa in view of Sakaida disclose all of the limitations according to claim 12 above. However, Niikawa in view of Sakaida fails to distinctly disclose storing an archival image corresponding to the ambient image in a storage media.

Higashihara discloses in figure 3 a single lens reflex camera including an image sensor (10) to convert an object image into an electrical signal and an exposure part causing a film (F) (storing an archival image in a storage media) loaded on the camera to be exposed to light (col. 3, lines 50-65). Therefore, it would have been obvious for one skilled in the art to have been motivated to include the concept of a camera including an exposure part causing a film to be exposed to light and an image sensor to

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convert an object image into an electrical signal as disclosed by Higashihara in the camera capable of white balance and inverse white balance processing as disclosed by Niikawa in view of Sakaida. Doing so would provide a means for displaying a stored electrical signal so that the state of an object image obtained at the time of an exposure of a silver-halide film can be confirmed (Higahsihara: col. 1, lines 24-32).

Allowable Subject Matter

Claim 15 objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

The following is a statement of reasons for the indication of allowable subject matter: the prior art of record fail to anticipate or render obvious the following technical features as recited in the highlighted claims:

Re claim 15, the prior art fails to teach or suggest "...assessing a color value of said ambient light image; and wherein said white balance color space vector defines a white balancing from said color value to a white point for said designated illuminant".

Claims 1-11 and 16-24 allowed.

The following is a statement of reasons for the indication of allowable subject matter: the prior art of record fail to anticipate or render obvious the following technical features as recited in the highlighted claims:

Re claims 1, 9, 10, and 16 the prior art fails to teach or suggest "...determining a reverse color space vector originating at said color value and extending opposite said white balance color space vector".

Conclusion

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Hirasawa et al. (US 2002/0085099) discloses an image sensing apparatus for sensing moving and still images.

Hafele et al. (US 5,926,213) discloses a device for correcting the tone of color pictures recorded by a video camera.

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Takei (US 6,108,037) discloses an image pickup apparatus in which the white balance controller contains a circuit to calculate the color temperature from the color signals.

Ohta et al. (US 6,493,027) discloses an apparatus for still and moving image recording and control thereof.

Suzuki et al. (US 4,918,519) discloses a color image sensing apparatus having a color balance adjustment.

Contacts


Any inquiry concerning this communication or earlier communications from the examiner should be directed to Kelly L. Jerabek whose telephone number is 703-305-8659. The examiner can normally be reached on Monday - Friday (8:00 AM - 5:00 PM).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Wendy Garber can be reached on 703-305-4929. The fax phone number for submitting all Official communications is 703-872-9306. The fax phone number for submitting informal communications such as drafts, proposed amendments, etc., may be faxed directly to the Examiner at 703-746-3059.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

KLJ



AUNG MOE
PRIMARY EXAMINER